

Destroy this report when it is no longer needed. Do not return to sender.

UNCLASSIFIED

REPORT DOCUMENTATION PAGE	READ INSTRUCTIONS BEFORE COMPLETING FORM
1. REPORT NUMBER 2. GOVT ACCESSION NO. DNA 4430F-1	3. RECIPIENT'S CATALOG NUMBER
4. TITLE (and Subtitle) AN ASSESSMENT OF EUROPEAN ATTITUDES ON TACTICAL NUCLEAR FORCE MODERNIZATION Volume I—Executive Summary	5. TYPE OF REPORT & PERIOD COVERED Final Report for Period November 1975—December 1977 5. PERFORMING ORG. REPORT NUMBER
7. AUTHOR(s)	B. CONTRACT OR GRANT NUMBER(s)
James E. Dornan, Jr.	DNA 001-76-C-0169 Jav
9. PERFORMING ORGANIZATION NAME AND ADDRESS SRI International, Strategic Studies Center 1611 North Kent Street	10. PROGRAM ELEMENT, PROJECT, TASK AREA & WORK UNIT NUMBERS Subtask U99QAXNL122-10
Arlington, Virginia 22209	12. REPORT DATE
11. CONTROLLING OFFICE NAME AND ADDRESS Director	December 1977
Defense Nuclear Agency Washington, D.C. 20305	13. NUMBER OF PAGES
14 MONITORING AGENCY NAME & ADDRESS(if different from Controlling Office)	15. SECURITY CLASS (of this report) UNCLASSIFIED
	15a. DECLASSIFICATION/DOWNGRADING SCHEDULE
16. DISTRIBUTION STATEMENT (of this Report)	1
Approved for public release; distribution unlimite	d.

17. DISTRIBUTION STATEMENT (of the abstract entered in Block 20, if different from Report)

18. SUPPLEMENTARY NOTES

This work sponsored by the Defense Nuclear Agency under RDT&E RMSS Code B364076464 U99QAXNL12210 H2590D.

19. KEY WORDS (Continue on reverse side if necessary and identify by block number)

Tactical Nuclear Weapons

Political-Social-Economic Environment

Tactical Nuclear Operations Foreign Policy

NATO

Force Modernization

Political Science

20. ABSTRACT (Continue on reverse side if necessary and identify by block number)

This report analyzes existing views in Europe, especially in the Federal Republic of Germany and the United Kingdom, toward tactical nuclear weapons I assesses possible reactions in Europe toward the modernization of NATO's tactical nuclear force, especially through the introduction of high-accuracy, tailored-effects weapons with the potential for increasing military effectiveness while substantially reducing collateral damage in the event of ware and discusses ways in which European opinion might be made more receptive to tactical nuclear force modernization.

There is a

DD 1 JAN 73 1473 LEDITION OF 1 NOV 65 IS OBSOLETE

UNCLASSIFIED

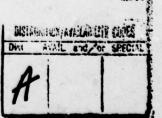
SECURITY CLASSIFICATION OF THIS PAGE (When Data Entered)

PREFACE

For twenty years, European opinion toward the modernization of NATO's tactical nuclear force has been rather ambivalent. On the one hand, West European governments have welcomed the introduction of new delivery systems such as Pershing, Lance, and the F-16 into NATO's force structure. Past <u>public</u> debates over tactical nuclear issues, on the other hand, especially those aroused by the "Carte Blanche" exercise, the proposal to implant atomic mines along the East-West frontier in Germany, the so-called Weizsacker study, and the 1973 press reports on "mini-nukes", have not created a helpful climate for thorough discussion of the utility of new nuclear technologies. Widespread fears that a conflict in Europe would result in population damage on a massive scale, in fact have in the past been an important obstacle to a balanced consideration by European political leaders and especially by the general public of the possible role of new nuclear technologies in enhancing both deterrence and defense in Europe.

The potential of new technologies for substantially reducing collateral damage in the event of war is now widely accepted in the United States, and the conviction that new technology may make possible the development of new--and the appropriate revision of old--tactical doctrines is spreading among U.S. analysts. It remains uncertain, however, how these possibilities are looked upon in Europe. This report seeks to analyze these and related questions.

The study was proposed under the general supervision of Richard B. Foster, Director of the SSC, and Harold Silverstein, Special Assistant to the Director. The Director played a particular role in analyzing the strategic and tactical problems presently confronting the NATO Alliance and in identifying solutions to them. The Project Leader



and author of the report was Dr. James E. Dornan, Jr. The following European consultants contributed both Input Papers analyzing key problems which emerged in the course of research, and specific contributions to sections of the report bearing on their particular area of expertise: Hans Ruhle of the Konrad Adenauer Institute, Federal Republic of Germany; Uwe Nerlich of the Stiftung Wissenschaft und Politik, Federal Republic of Germany; John Erickson of the University of Edinburgh; Colin Gray of the Hudson Institute; and S.W.B. Menaul of the Royal United Services Institute, London. General B.E. Spivy, U.S. Army (Ret), Major General Hamilton A. Twitchell, U.S. Army (Ret), John Scharfen, and Dr. Stephen P. Gibert served as review critics.

Richard B. Foster Director Strategic Studies Center

EXECUTIVE SUMMARY

A. Statement of the Problem

In recent years, a combination of technological and policy developments has reinforced the U.S. view of the importance of theater nuclear systems for deterrence and defense in Europe. The new family of nuclear weapons--those now in development and those planned for the near term-is characterized by a potential for added military efficiency and substantially lowered levels of collateral damage through improved targeting capabilities, greater accuracy, reduced yields, and a variety of special targeting effects. Moreover, recent assessments of weapons effects as well as the development of new assessment methods have reduced some of the uncertainties associated with the use of tactical nuclear systems, and provided at least tentative answers to such questions as the extent and the effectiveness of various kinds of shielding techniques in protecting urban populations. The ongoing and proposed modernization of NATO's tactical nuclear forces should enhance both the credibility of deterrence and the capacity of the Alliance to contain a Warsaw Pact attack in Europe should deterrence fail. These views have been reflected in a variety of U.S. proposals put forward in recent years for the modernization of NATO's tactical nuclear force, and in other proposals now being considered.

U.S. policymakers, however, might be uncertain of the reaction of the European states to certain aspects of the proposed modernization program. Consultations at the official level--particularly with the Ministry of Defense in both the Federal Republic of Germany and the United Kingdom and with high officials in the armed forces of the FRG--have been encouraging. However, the potential reaction of other decision-makers in Europe, and especially of European public opinion, is less clearly understood.

For more than twenty years European opinion toward the modernization of NATO's tactical nuclear force has been rather ambivalent. On the one hand, Western European governments have generally welcomed the introduction of new delivery systems such as Pershing, Lance, and the F-16 into NATO's force structure. Some of the more important public debates on nuclear issues in Western Europe, on the other hand, have in the past developed in ways not helpful to a balanced consideration of the possible utility of new nuclear technologies in enhancing both deterrence and defense in Europe. Fears that a conflict on the continent involving nuclear weapons would result in population damage on a massive scale were widespread during the 1950's and 1960's, and continue to exist down to the present day. Soviet propaganda has been quick to capitalize on such fears. Moreover, for a variety of reasons, including economic, European strategic thinking has exhibited a clear preference for deterrence over defense. Thus, tactical nuclear weapons have generally been regarded in Europe as useful primarily for their role in deterrence and as a link between European defense and U.S. strategic forces. Proposals for improving NATO's nuclear war fighting capabilities have often been resisted, and sometimes served to reinforce longstanding European suspicions that the United States would prefer to "decouple" its strategic deterrent from the defense of Europe. Finally, European opinion, especially public opinion, does not appear to be adequately informed concerning the possibilities for reduced collateral damage and other advantages of the new nuclear systems. This lack of understanding may be an obstacle to European acceptance of any proposals for modernization of NATO's tactical nuclear systems.

Political considerations thus continue to be an important factor inhibiting NATO force modernization. In the absence of specific information concerning European attitudes on new nuclear systems and weapons employment concepts, especially those promising reduced collateral damage, uncertainties will remain concerning how the deployment of these systems will affect political cohesion within the NATO Alliance. Without such information, moreover, it will be difficult to determine how an effort to address the collateral damage issue might affect European public opinion.

Would a more widespread dissemination of information on the new systems be politically helpful in furthering plans for "population management," civil defense etc. in the event of war in Europe? Or would public discussion of such questions in Europe under current conditions evoke unwarranted fears and cause divisiveness in the Alliance? Such political considerations clearly must be taken into account in planning force modernization. It is with these questions in mind that SSC/SRI has undertaken this effort, as part of both the Center's parallel study of possible Soviet responses to NATO force modernization and its ongoing research on European perceptions and views of defense matters.

B. Nature of the Research Task

The SSC undertook the following principal tasks as part of the study effort:

- A review of available data in completed and ongoing analyses on:
 - the characteristics and capabilities of new tactical nuclear weapons systems, particularly the possibilities for reduced collateral damage inherent in the new systems
 - the use of shielding techniques for reducing collateral damage, and
 - new techniques for assessing the collateral damage likely to result from the employment of nuclear weapons.
- An assessment of attitudes in Europe toward existing tactical nuclear systems and the collateral damage levels associated with them.
- An assessment of possible attitudes in Europe toward the modernization of the tactical nuclear force, and specifically toward the reduced collateral damage levels expected as a result of weapons modernization, the use of shielding techniques, and the use of improved methods for assessing collateral damage. More specifically, an effort was made to evaluate the persistence of old attitudes and the extent to which such attitudes carry over and affect attitudes toward new nuclear weapons.

 An analysis of the political implications and hazards involved in communicating information concerning the reduced collateral damage associated with new U.S./NATO nuclear systems.

The task of analysis was complicated by several difficulties.

First, a considerable variety of opinion on defense issues exists on the continent; moreover, political ideologies and positions on military matters interact, in Europe as elsewhere, in many ways: some individuals of a "liberal" political outlook assume a "soft" line on military questions, while others with similar views take a "hard" position. The same is true of "conservatives". If the state of European opinion is to be adequately assessed, therefore, a thorough canvass of opinion should be undertaken.

That, however, is not an easy undertaking. The defense communities in the NATO-European states are relatively small, and their interface with the public tends in the main not to involve discussion of issues of strategic substance. In addition, the defense bureaucracies of the non-American members of NATO do not generally reveal their internal debates and squabbles to the public (one reason, of course, is that several NATO nations have Official Secret Acts which are taken seriously). Thus, informed persons outside the official defense system—and therefore at liberty to air their views—tend to be few in number, and also tend to lack political leverage due to their limited access to centers of genuine influence over policy. Knowledge of complex defense issues among the public at large, moreover, is nearly nonexistent.

Finally, there is a lack of readily accessible polling data on public attitudes in Europe on nuclear issues, particularly for the past several years.

In discussions with the sponsoring agency, it was decided to focus on attitudes in the FRG and the United Kingdom, where opinion can be expected to have the most significant impact on any NATO decision concerning nuclear force modernization.

The analysis, therefore, relied on several sources for data and information. Ample documentation exists, in published studies by academic and other analysts and in press reports, concerning public reaction to such past controversies in Europe as those surrounding the NATO "Carte Blanche" tactical nuclear exercise of 1955, the ADM debate of 1966, and the 1973 "Mini-nuke" debate. This documentation was examined and analyzed in an effort to trace the origin and development of Western European thinking on nuclear issues, and in order to permit an assessment of the present strength and relevance of past attitudes. A group of European analysts, most of them connected with research institutes on the continent, were commissioned to prepare background papers, assessing both European attitudes and the likely evolution of such attitudes in the future. In doing so, they drew upon past studies undertaken by their own research organizations. Such polls as were available were consulted, as well as all available official statements, government documents, speeches by government spokesmen and political figures, position papers issued by political parties, and media commentary.

C. Principal Findings

There is no doubt that past European fears concerning the consequences of a war in Europe in which nuclear weapons were utilized continue to some extent to affect attitudes on the continent toward nuclear issues. This is especially true of the general public, and of political bodies associated with the European left. To that extent

These included Hans Ruhle of the Konrad Adenauer Institute, Federal Republic of Germany; John Erickson of the University of Edinburgh; Colin Gray of the Hudson Institute; and S.W.B. Menaul of the Royal United Services Institute, London. General B.E. Spivy, U.S. Army (Ret), Major General Hamilton A. Twitchell, U.S. Army (Ret), and Dr. Stephen P. Gibert, consultants to the SSC, served as review critics.

The scope of the project did not permit the SSC to conduct its own polls.

the results of earlier controversies such as that which arose over "Carte Blanche" live on, and the possibility that a public controversy with significant political implications could arise over proposals to modernize NATO's tactical nuclear force continues to exist. Given the strength of left-wing forces within the governing Labour government in Great Britain and the SPD in West Germany, both governments can be expected to deal very cautiously with nuclear issues in their public pronouncements, whatever the private views of the leadership. Should an extended and inflamed public debate arise, this might be even more true, as the recent controversy on the so-called neutron bomb suggests. (Certain FRG spokesmen such as Georg Leber and Hans-Dietrich Genscher, however, have been quite balanced in their comments on the possible deployment of ER weapons in Europe, despite the inflammatory remarks by SPD leader Egon Bahr.)

There has been a progressive decline over the past decade, however, in the hysteria which has often characterized the public debate in Europe on tactical nuclear weapons and related issues (such as collateral damage) in the past. The ADM, Weizsacker study and mini-nuke controversies have stimulated successively less public controversy, particularly in comparison with "Carte Blanche." There are strong indications, moreover, that attitudes on defense issues in general, and perhaps on tactical nuclear issues as well, are beginning to change. At the very least the general climate of opinion on military questions has altered in recent years.

First of all, perceptions of the military balance and of political-military stability which prevailed for more than a decade have begun to shift, both in the public consciousness and in the minds of European decisionmakers. The enormous increase in the military power of the USSR, and the effects of increased Soviet military power upon both the overall strategic balance and the military balance in Europe, is no longer ignored by the public on the continent to the extent that it was during the 1960s. European officials, in fact, reversing the

situation which prevailed during the middle and late fifties, have in recent years been far more skeptical about the prospects for detente and for a permanent improvement in East-West relations than have their American counterparts. During the past year indications that the Soviet Union is moving to strengthen its European-based nuclear forces through deployment in the theater of the Backfire Bomber and the SS-20 missile have generated particular alarm.

Along with these changed perceptions of the threat have come significant shifts in European views concerning the most likely way in which the Soviet threat would be actualized. Throughout most of NATO's history it has been assumed that a conflict in Europe would start as a consequence of overt Soviet aggression; many commentators assumed as well that the Soviet Union would immediately resort to disarming nuclear strikes in order to bring the war to an end decisively and quickly. Under these assumptions, even technologically improved theater nuclear capabilities were considered by many Europeans to be of but marginal importance; the aggregate damage resulting from use by both the Warsaw Pact and NATO of theater nuclear weapons was thought to rule out the possibility of a nonsuicidal defense against the expected Soviet assault. Many European strategic thinkers have begun to conclude, however, that a conflict in Europe, or conflicts which may spill over into the European theater, are increasingly likely to develop in more indirect ways. Soviet military involvements in, e.g., Yugoslavia, the Middle East, Iran, or Southern Africa, which could not be regarded as overt aggression against NATO, could conceivably develop in such a way as to involve one or more of the NATO states, and ultimately lead to conflict in Central Europe itself. In the view of a growing number of Europeans, therefore, NATO requires a wider range of military options than have heretofore existed.

By the same token, some European students of Soviet strategy now believe that the likelihood of a conventional phase in any major conflict in Europe is somewhat greater than usually believed. As John Erickson and others have emphasized, Soviet military strategy in the event of war is likely to be governed in the last analysis by political objectives; wholesale destruction in Western Europe would not be compatible with Soviet postwar objectives. Some European observers thus believe that both a conventional phase (perhaps including the use of CBU, however) and a phase of truly limited nuclear war in any future European conflict are now possible. The latter, in turn, might be even more likely if NATO possessed the military capability to wage that sort of conflict.

There is also an important body of European opinion which is convinced that the primary purpose of Soviet military deployments in Europe is not military but political. According to this view, the primary Soviet strategic objective in Europe is to bend the political will of the Western states to Soviet purposes. From that perspective, the existing imbalance of military force on the continent in favor of the Soviet Union, and the declining credibility of NATO theater nuclear doctrine, can only enhance the achievement of Soviet objectives. By the same token, the most appropriate Western political response to Soviet strategy in Europe would be the development of a coherent and credible military doctrine for defeating the Soviet Union in the event of war. The modernization of NATO's defense doctrine and force deployments is seen by some Europeans as the most appropriate means to that end.

Finally, there is an increasing—if still limited—awareness in Europe of the possibilities inherent in new nuclear and other technologies, including an awareness of the possibility that under certain conditions a nuclear war in Europe might not lead to unrestricted collateral damage. The "magic of numbers", for example, appears to be of declining significance for many Europeans. While considerable interest still exists in the size of the American tactical nuclear arsenal in Western Europe, there is far less disposition to defend a particular level (e.g., 7,000 warheads) than was the case several years ago, especially in the United Kingdom and in the Federal Republic of Germany. It is clear that reductions in the number of American tactical

nuclear warheads deployed in Europe which might occur as a result of a modernization process which is perceived to have military value will not today meet the kind of political resistance in Western Europe which it would have a few years ago. Such European leaders as Georg Leber and such influential defense analysts as Adelbert Weinstein, Lord Chalfont and others have exhibited keen interest in the military potential of new technology, and particularly of precision-guided munitions. During the past year a number of articles have appeared in the British and German press and in professional journals analyzing the military potential of new weapons systems, and emphasizing in particular the low collateral damage associated with such systems.

The full military value of the new nuclear weapons, however, including their potential for reducing collateral damage in the event of nuclear war in Europe, has only recently begun to be seriously considered by European analysts outside official circles. Moreover, although European thinking on the modernization of NATO's tactical nuclear force is clearly changing, only limited consideration up to now has been given to the collateral damage issue. While it is possible, therefore, that a U.S. approach to Europe on nuclear force modernization which stressed the utility of the new weapons for achieving goals clearly agreed upon by the Alliance, especially deterrence and early war termination, might be well received, such an approach would have to be carefully prepared and developed. Difficult though it may be to calm European fears on this point, such an approach would have to be accompanied by specific U.S. assurances -- and supporting policies -- that the "decoupling" of the United States from European defense is not the ultimate motive and will not be perceived as such by the WP. If the U.S. proposals are perceived as presaging "decoupling", in fact, nothing will persuade the Europeans that modernizing NATO's tactical nuclear force is desirable.

We believe United States officials should continue to point out to their European counterparts that the new, lower-collateral damage militaryeffective nuclear systems will contribute positively to deterrence and defense in Europe. Tactical nuclear force modernization should be explained in terms of the enhanced capabilities which it offers for tasks already endorsed by the Alliance as a whole. Specifically, we believe a modernized tactical nuclear arsenal should be presented to Europe (a) as offering, through dispersal and greater security, far less attractive a target structure to preemption-minded Soviet strategic planners than the present force; (b) as offering a far more usable set of options against Soviet and WP forces in the field should war occur than is now the case, because weapons effects can be better tailored with the new systems to suit particular targets; and (c) as contributing to NATO's capacity to offset the chemical warfare capabilities of the WP in the European theater. Furthermore, for those Europeans who are nervous about the very early nuclear use implications of low collateral damage nuclear systems, it must be emphasized that the new tactical nuclear posture we advocate will only make sense in the context of an improved forward conventional defense capability.

The American proposals for tactical nuclear force modernization should also be explained as motivated by a determination to deny to the Soviet Union the leverage that flows from the current military imbalance in favor of the USSR, and, in the event that war occurs, the leverage that would flow from swift Soviet occupation of substantial NATO assets.

For the present, we believe the U.S. approach to Europe on tactical nuclear force modernization should be basically confined to the European political leadership. A public debate at this stage, before government officials and political leaders are themselves prepared to deal adequately with the complex issues involved, would be premature and probably counterproductive, as the controversy over the "neutron bomb" indicates. Efforts should continue to be made, however, to expand discussions and debates within the Alliance on the technological and doctrinal issues involved in nuclear force modernization and on the possibility of reduced collateral damage. As the SSC's West German consultants in particular have emphasized, recent and ongoing consultation patterns within the framework of the Nuclear Planning Group and other forums have been extremely

productive; the work of the NPG reflects a background of increasingly shared European-American experience which was lacking in earlier exchanges of this sort. These and similar exchanges should be continued and expanded.

Finally, greater efforts should be made to coordinate the views on tactical nuclear issues held by U.S. military and diplomatic officials, in order to avoid the confusion over U.S. policies and intentions which has occurred at least occasionally in the past.

DISTRIBUTION LIST

DEPARTMENT OF DEFENSE

Assistant Secretary of Defense (Intelligence)
Department of Defense
ATTN: I&W/IRA

Director
Planning & Evaluation
Office of the Secretary of Defense
ATTN: Strat. Prgms.

Assistant to the Secretary of Defense Atomic Energy Department of Defense ATTN: Nuc. Policy Planning

Defense Documentation Center Cameron Station 12 cy ATTN: TC

Director
Defense Intelligence Agency
ATTN: DIR-4

Director
Defense Nuclear Agency
ATTN: DDOA
ATTN: DDST
3 cy ATTN: TITL
ATTN: VLWS
ATTN: TISI
ATTN: STVL
ATTN: RATN
ATTN: STNA

Under Secretary of Defense Research & Engineering Department of Defense

ATTN: S&SS(OS)

ATTN: PORA

Commander
Field Command
Defense Nuclear Agency
2 cy ATTN: FCPR

Chief Livermore Division, FCDNA Lawrence Livermore Laboratory ATTN: FCPRL

Office of Secretary of Defense International Security Affairs ATTN: Reg. Dir. (European)

Office of Secretary of Defense Director Net Assessment Department of Defense ATTN: Director

OJCS

ATTN: J-5 (Plans & Policy)

USNMR Supreme Headquarters Allied Powers Europe ATTN: U.S. Documents Officer

DEPARTMENT OF DEFENSE (Continued)

Commander in Chief Allied Forces Southern Europe ATT: U.S. Documents Officer

DEPARTMENT OF THE ARMY

Commander Harry Diamond Laboratories ATTN: DELHD-NP

DEFARTMENT OF THE NAVY

fficer-in-Charge Naval Surface Weapons Center ATTN: CODE WX21, Tech. Lib.

DEPARTMENT OF THE AIR FORCE

Deputy Chief of Staff Llans and Operations Heddquarters, USAF ATTN: AFXOC

Deputy Chief of Staff Research and Development ATT: RDQSM

Assistant Chief of Staff Studies and Analysis ATTN: SAC

AF Weapons Labora ory, AFSC ATTN: SUL

OTHER GOVERNMENT AGENCY

Central Intelligence Agency
ATTN: RD/SI Rm. 548 Hqs. Bldg. for OSR/SEC

DEPARTMENT OF DEFENSE CONTRACTORS

General Electric Company TEMPO-Center for Advanced Studies ATTN: DASIAC

SRI International Strategic Studies Center ATTN: James E. Dornan, Jr.